

Warning: Hot Coffee!

Fuel Hoarding and Container Sizes

No. HC-2015-1 February 4, 2015

Learning Objective: The student will be able to identify maximum allowable flammable and combustible liquid container sizes.

While drivers in the United States and many other parts of the world are enjoying the lowest automotive fuel prices in decades, fire protection personnel should be planning for changes in the market. Historically, when fuel prices rise, consumers will begin hoarding as a hedge against higher costs.

Consumers will often use any available container to collect and store fuel: Paint cans, glass bottles, and nonapproved large plastic barrels, as shown in the illustration, become convenient, but dangerous, storage vessels. Fuels should only be stored in containers approved by the code official and in quantities limited



These polyethylene drums were found to be full of gasoline, a Class IB flammable liquid. Their capacity for Class IB liquids exceeds that permitted by the model codes.

by the codes. Generally, in residential occupancies, the storage of Class I (gasoline and gasohol) and Class II (some diesel blends) flammable and combustible liquids is limited to 10 gallons (38 liters (L)). Up to 180 gallons (661 L) may be stored if they are in an approved flammable liquid storage cabinet.

The following chart summarizes the maximum allowable flammable and combustible liquid container sizes based on product characteristics and container type. The information below represents only a portion of the entire table. Refer to Chapter 9 of National Fire Protection Association (NFPA) 30, Flammable and Combustible Liquids Code, for the entire chart.

Maximum Allowable Size: Containers and Portable Tanks

Extracted from NFPA 30, Flammable and Combustible Liquids Code, Copyright © 2014, National Fire Protection Association.

	Flammable Liquids			Combustible Liquids	
Container Type	Class IA	Class IB (Example: Gasoline)	Class IC	Class II (Example: Diesel)	Class IIIA
Glass	1 pint (0.5 L)	1 quart (1 L)	1.3 gallons (5 L)	1.3 gallons (5 L)	5.3 gallons (20 L)
Metal (other than drum) or approved plastic	1.3 gallons	5.3 gallons	5.3 gallons	5.3 gallons	5.3 gallons
	(5 L)	(20 L)	(20 L)	(20 L)	(20 L)
Safety cans	2.6 gallons	5.3 gallons	5.3 gallons	5.3 gallons	5.3 gallons
	(10 L)	(20 L)	(20 L)	(20 L)	(20 L)
Metal drum ¹	119 gallons	119 gallons	119 gallons	119 gallons	119 gallons
	(450 L)	(450 L)	(450 L)	(450 L)	(450 L)
Polyethylene drum ¹	1.3 gallons	5.3 gallons	5.3 gallons	119 gallons	119 gallons
	(5 L)	(20 L)	(20 L)	(450 L)	(450 L)

¹ Meeting specific United Nations (U.N.) or U.S. Department of Transportation standards (e.g., U.N. 1A1/1A2 or U.N. 1H1 and U.N. 1H2).

For additional information, consider signing up for the National Fire Academy's six-day course "Hazardous Materials Code Enforcement" (R0615) at http://apps.usfa.fema.gov/nfacourses/catalog/details/10504.

Eligible for Continuing Education Units (CEUs)